

**APRIL/MAY 2023**

**CEBT54A — BIOFERTILIZER  
TECHNOLOGY**

**Time : Three hours**

**Maximum : 75 marks**

**SECTION A — (10 × 2 = 20 marks)**

**Answer ALL questions.**

1. What are biofertilizers?
2. Explain about organic fertilizers.
3. What are blue green algae?
4. Outline the importance of azotobacter.
5. How is azospirillum identified?
6. Outline the role of phosphate solubilizer.
7. What is meant by microbial inoculants?
8. Explain the response of crops to biofertilizers.
9. What is meant by symbionts?
10. Summarize the limitations of azolla.



SECTION B — (5 × 5 = 25 marks)

Answer ALL questions.

11. (a) Identify the importance and advantages of natural fertilizers.

Or

- (b) Analyse the significance of fertilizers.

12. (a) Identify the steps involved in isolation of rhizobium.

Or

- (b) Examine the culturing method for azotobacter.

13. (a) Identify the significance of blue green algae.

Or

- (b) Examine the morphology of azospirillum.

14. (a) Organize the concepts behind the use of microbes as biofertilizers.

Or

- (b) Examine the preparation of microbial inoculants.

15. (a) Identify the morphological features of azolla.

Or

- (b) Examine the applications of azolla.

SECTION C — (3 × 10 = 30 marks)

Answer any THREE questions.

16. Explain the types of fertilizers.

17. Deduce the culturing methods and enumeration of microbes.

18. Explain the morphology and characteristic features of rhizobium.

19. Elaborate on the large scale production of microbes.

20. Discuss on distribution and biochemical characteristics of azolla.